

Remarks

The Office Action mailed April 19, 2006 has been carefully reviewed and the foregoing amendment has been made in consequence thereof.

Claims 1-27 are now pending in this application. Claims 1-22 stand rejected. Claims 3, 10, 13, 16, and 17 have been cancelled. Claims 23-27 are newly added. No additional fee is due for newly added Claims 23-27.

The rejection of Claims 1-22 under 35 U.S.C. § 103(a) as being unpatentable over Stevenson (U.S. Patent 6,737,570) is respectfully traversed.

Applicants respectfully traverse the Office Notice on page 3 of the Office Action that “the use of a headset, which comprises a microphone and a headphone, in combination with audio equipment or musical instruments is notoriously old and well-known in the art of audio equipment.” Stevenson does not describe or suggest the use of a headset having a microphone and headphone, as is required by the Applicants’ claimed invention. Further, Applicants submit that it is not well-known in the art to use a headset having a microphone and a headphone, wherein the headset receives an input through the microphone and transmits the same input, or an altered version thereof, through the headphone.

Stevenson describes a battery powered personal audio device having touch operators. The personal audio device may play back audio files such as compact disc or digital audio stream. The user may interject sounds or audio effects onto the ongoing playback of the audio by operating one or more touch operators. Additionally, the operator may interject the users voice into the playback via a microphone integrally formed into the personal audio device. The playback of the audio is then transmitted to headphones. Notably, Stevenson does not describe a processor that transmits a signal to a remote receiver such that the signal can be processed and transmitted back to the processor. Rather, Stevenson describes a personal audio device configured to play back audio files and receive sounds or audio effects in the ongoing playback of the audio by operating one or more touch operators.

Claim 1 recites an apparatus comprising “a headset comprising a microphone and a headphone . . . a music generation device . . . a processing unit contained in a single housing, said processing unit electrically coupled with said headset and said music generation device for receiving a first input signal from said microphone and a second input signal from said music generation device, said processing unit comprising a transmitter for transmitting said first input signal to a remote receiver to be processed and an input to couple to a receiver for receiving a processed signal from the remote receiver, said processing unit configured to amplify and add an intended effect to at least one of the first input signal, the second input signal, and the processed signal to generate an output signal, wherein the output signal is transmitted to said headphone to enable a user to hear the output . . . a user input interface coupled to said housing of said processing unit, said user interface configured to control the output signal of said processing unit by altering the amplification of at least one of the first input signal, the second input signal, and the processed signal.”

Stevenson does not describe or suggest an apparatus as is recited in Claim 1. More specifically, Stevenson does not describe or suggest an apparatus comprising a transmitter for transmitting a first input signal to a remote receiver to be processed and an input to couple to a receiver for receiving a processed signal from the remote receiver, as is required by the Applicants’ claimed invention. Rather, in contrast to the present invention, Stevenson describes a personal audio device configured to play back audio files and receive sounds or audio effects in the ongoing playback of the audio by operating one or more touch operators. Accordingly, for at least the reasons set forth above, Claim 1 is submitted to be patentable over Stevenson.

Claims 1-7 depend from independent Claim 1. When the recitations of Claims 1-7 are considered in combination with the recitations of Claim 1, Applicants submit that dependent Claims 1-7 likewise are patentable over Stevenson.

Claim 8 recites a method for mixing and controlling sound, wherein the method comprises “transmitting a first input signal from a headset to a processing unit . . . communicating a second input signal from a portable music generating device to the processing unit . . . transmitting the first input signal from the processing unit to a remote

receiver to be processed . . . receiving at the processing unit a processed signal from the remote receiver . . . processing at the processing unit at least one of the first input signal, the second input signal, and the processed signal for generating an output signal . . . controlling the output signal of said processing unit by altering the amplification of at least one of the first input signal, the second input signal, and the processed signal . . . transmitting the output signal to the headset.”

Stevenson does not describe or suggest a method for mixing and controlling sound as is recited in Claim 8. More specifically, Stevenson does not describe or suggest a method comprising transmitting a first input signal from a processing unit to a remote receiver to be processed and receiving at the processing unit a processed signal from the remote receiver, as is required by the Applicants’ claimed invention. Rather, in contrast to the present invention, Stevenson describes a personal audio device configured to play back audio files and receive sounds or audio effects in the ongoing playback of the audio by operating one or more touch operators. Accordingly, for at least the reasons set forth above, Claim 8 is submitted to be patentable over Stevenson.

Claims 9-13 depend from independent Claim 8. When the recitations of Claims 9-13 are considered in combination with the recitations of Claim 8, Applicants submit that dependent Claims 9-13 likewise are patentable over Stevenson.

Claim 14 recites a sound system comprising “a sound board for receiving, processing, and transmitting sound . . . a portable studio system configured to communicate with said sound board, said portable studio system comprising . . . a headset comprising a headphone and a microphone configured to transmit a first input signal from a user’s voice . . . a music generation device configured to communicate a second input signal . . . a processing unit contained in a single housing, said processing unit electrically coupled with said headset and said music generation device for receiving said first and second input signals, said processing unit comprising a transmitter for transmitting said first input signal to said sound board to be processed and an input to couple to a receiver for receiving a processed signal from the sound board, said processing unit configured to amplify and add an intended effect to at least one of the first input signal, the second input signal, and the processed signal to generate an output

signal, wherein the output signal is transmitted to said headphone . . . a user input interface coupled to said housing of said processing unit, said user interface configured to control the output signal of said processing unit by altering the amplification of at least one of the first input signal, the second input signal, and the processed signal.”

Stevenson does not describe or suggest a sound system as is recited in Claim 14. More specifically, Stevenson does not describe or suggest a sound system comprising a transmitter for transmitting a first input signal to a sound board to be processed and an input to couple to a receiver for receiving a processed signal from the sound board, as is required by the Applicants’ claimed invention. Rather, in contrast to the present invention, Stevenson describes a personal audio device configured to play back audio files and receive sounds or audio effects in the ongoing playback of the audio by operating one or more touch operators. Accordingly, for at least the reasons set forth above, Claim 14 is submitted to be patentable over Stevenson.

Claims 15-22 depend from independent Claim 14. When the recitations of Claims 15-22 are considered in combination with the recitations of Claim 14, Applicants submit that dependent Claims 15-22 likewise are patentable over Stevenson.

For the reasons set forth above, Applicants respectfully request that the Section 103 rejection of Claims 1-22 be withdrawn.

The rejection of Claims 1-22 under 35 U.S.C. § 103(a) as being unpatentable over Ng (U.S. Patent 6,328,570) is respectfully traversed.

Applicants respectfully traverse the Office Notice on page 4 of the Office Action that “the use of a headset, which comprises a microphone and a headphone, in combination with audio equipment or musical instruments is notoriously old and well-known in the art of audio equipment.” Ng does not describe or suggest the use of a headset having a microphone and headphone, as is required by the Applicants’ claimed invention. Further, Applicants submit that it is not well-known in the art to use a headset having a microphone and a headphone, wherein the headset receives an input through the microphone and transmits the same input, or an altered version thereof, through the headphone.

Ng describes a portable, programmable karaoke unit configured to store and retrieve data in compressed digital data format from an internal memory or a removable storage medium. The unit is operable by remote control and transmits audio data over radio frequencies. The unit may display visual data on an internal or external display. Data can be downloaded for storage from external sources such as a digital system or the Internet. The karaoke unit includes several input ports and several output ports. For example, the unit includes an audio output port 140, a headphone output port 142, two microphone input ports 144, a video output port 146, a video input port 150, and a power port 155. *see col. 3, lines 56-59.* Notably, Ng does not describe a processor that transmits a signal to a remote receiver such that the signal can be processed and transmitted back to the processor. Rather, Ng describes a karaoke unit that solely transmits signals such that they may be played on an audio device or solely receives signals such that they may be played on the karaoke unit.

Claim 1 recites an apparatus comprising “a headset comprising a microphone and a headphone . . . a music generation device . . . a processing unit contained in a single housing, said processing unit electrically coupled with said headset and said music generation device for receiving a first input signal from said microphone and a second input signal from said music generation device, said processing unit comprising a transmitter for transmitting said first input signal to a remote receiver to be processed and an input to couple to a receiver for receiving a processed signal from the remote receiver, said processing unit configured to amplify and add an intended effect to at least one of the first input signal, the second input signal, and the processed signal to generate an output signal, wherein the output signal is transmitted to said headphone to enable a user to hear the output . . . a user input interface coupled to said housing of said processing unit, said user interface configured to control the output signal of said processing unit by altering the amplification of at least one of the first input signal, the second input signal, and the processed signal.”

Ng does not describe or suggest an apparatus as is recited in Claim 1. More specifically, Ng does not describe or suggest an apparatus comprising a transmitter for transmitting a first input signal to a remote receiver to be processed and an input to couple to a receiver for receiving a processed signal from the remote receiver, as is required by the

Applicants' claimed invention. Rather, in contrast to the present invention, Ng describes a karaoke unit that solely transmits signals such that they may be played on an audio device or solely receives signals such that they may be played on the karaoke unit. Accordingly, for at least the reasons set forth above, Claim 1 is submitted to be patentable over Ng.

Claims 1-7 depend from independent Claim 1. When the recitations of Claims 1-7 are considered in combination with the recitations of Claim 1, Applicants submit that dependent Claims 1-7 likewise are patentable over Ng.

Claim 8 recites a method for mixing and controlling sound, wherein the method comprises "transmitting a first input signal from a headset to a processing unit . . . communicating a second input signal from a portable music generating device to the processing unit . . . transmitting the first input signal from the processing unit to a remote receiver to be processed . . . receiving at the processing unit a processed signal from the remote receiver . . . processing at the processing unit at least one of the first input signal, the second input signal, and the processed signal for generating an output signal . . . controlling the output signal of said processing unit by altering the amplification of at least one of the first input signal, the second input signal, and the processed signal . . . transmitting the output signal to the headset."

Ng does not describe or suggest a method for mixing and controlling sound as is recited in Claim 8. More specifically, Ng does not describe or suggest a method comprising transmitting a first input signal from a processing unit to a remote receiver to be processed and receiving at the processing unit a processed signal from the remote receiver, as is required by the Applicants' claimed invention. Rather, in contrast to the present invention, Ng describes transmitting signals solely to be played on an audio device or receiving signals solely to be played on a karaoke unit. Accordingly, for at least the reasons set forth above, Claim 8 is submitted to be patentable over Ng.

Claims 9-13 depend from independent Claim 8. When the recitations of Claims 9-13 are considered in combination with the recitations of Claim 8, Applicants submit that dependent Claims 9-13 likewise are patentable over Ng.

Claim 14 recites a sound system comprising “a sound board for receiving, processing, and transmitting sound . . . a portable studio system configured to communicate with said sound board, said portable studio system comprising . . . a headset comprising a headphone and a microphone configured to transmit a first input signal from a user’s voice . . . a music generation device configured to communicate a second input signal . . . a processing unit contained in a single housing, said processing unit electrically coupled with said headset and said music generation device for receiving said first and second input signals, said processing unit comprising a transmitter for transmitting said first input signal to said sound board to be processed and an input to couple to a receiver for receiving a processed signal from the sound board, said processing unit configured to amplify and add an intended effect to at least one of the first input signal, the second input signal, and the processed signal to generate an output signal, wherein the output signal is transmitted to said headphone . . . a user input interface coupled to said housing of said processing unit, said user interface configured to control the output signal of said processing unit by altering the amplification of at least one of the first input signal, the second input signal, and the processed signal.”

Ng does not describe or suggest a sound system as is recited in Claim 14. More specifically, Ng does not describe or suggest a sound system comprising a transmitter for transmitting a first input signal to a sound board to be processed and an input to couple to a receiver for receiving a processed signal from the sound board, as is required by the Applicants’ claimed invention. Rather, in contrast to the present invention, Ng describes a karaoke unit that solely transmits signals such that they may be played on an audio device or solely receives signals such that they may be played on the karaoke unit. Accordingly, for at least the reasons set forth above, Claim 14 is submitted to be patentable over Ng.

Claims 15-22 depend from independent Claim 14. When the recitations of Claims 15-22 are considered in combination with the recitations of Claim 14, Applicants submit that dependent Claims 15-22 likewise are patentable over Ng.

For the reasons set forth above, Applicants respectfully request that the Section 103 rejection of Claims 1-22 be withdrawn.

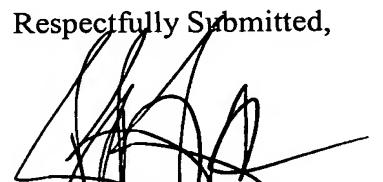
Newly added Claim 23 depends from independent Claim 1. When the recitations of Claim 23 are considered in combination with the recitations of Claim 1, Applicants submit that Claim 23 likewise is patentable over the cited art.

Newly added Claims 24 and 25 depend from independent Claim 8. When the recitations of these claims are considered in combination with the recitations of Claim 8, Applicants submit that Claims 24 and 25 likewise are patentable over the cited art.

Newly added Claims 26 and 27 depend from independent Claim 14. When the recitations of these claims are considered in combination with the recitations of Claim 14, Applicants submit that Claims 26 and 27 likewise are patentable over the cited art.

In view of the foregoing amendments and remarks, all the claims now active in this application are believed to be in condition for allowance. Reconsideration and favorable action is respectfully solicited.

Respectfully Submitted,



Robert B. Reeser III
Registration No. 45,548
ARMSTRONG TEASDALE LLP
One Metropolitan Square, Suite 2600
St. Louis, Missouri 63102-2740
(314) 621-5070